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- 41. A method for producing a crystalline substrate based device comprising:
forming a microstructure on a crystalline substrate; and
sealing at least one transparent packaging layer over said microstructure by
means of an adhesive so as to define therewith at least one gap between said crystalline
substrate and said at least one packaging layer,
wherein said microstructure receives light via said at least one transparent packaging
layer.
42. A method for producing a crystalline substrate based device according to claim 41 and
wherein said at least one packaging layer is sealed onto said crystalline substrate using an
adhesive.
43. A method for producing a crystalline substrate based device according to claim 42 and
wherein said adhesive comprises epoxy.
44. A method for producing a crystalline substrate based device according to claim 41 and
wherein said crystalline substrate comprises silicon.
45. A method according to claim 41 wherein the substrate, microstructure and
packaging layer form a chip scale package having edge surfaces, the method also comprising
plating a multiplicity of electrical contacts along said edge surfaces.
46. A method for producing a crystalline substrate based device according to claim 41
and wherein said at least one gap comprises a plurality of gaps.
47. A method for producing a crystalline substrate based device according to claim 41 and
wherein said microstructure comprises a micromechanical structure.
48. A method for producing a crystalline substrate based device according to claim 41 and
wherein said microstructure comprises a microelectronic structure.
49. A method for producing a crystalline substrate based device according to claim 41 and
wherein said microstructure comprises a optoelectronic structure.

50. A method for producing a chip scale packaged crystalline substrate comprising:
forming a microstructure on a substrate; and
sealing at least one chip scale package over said microstructure, defining
therewith at least one gap,
and wherein said at least one package is at least partially transparent.
51. A method for producing a chip scale packaged crystalline substrate according to claim 50 and wherein said at least one package is sealed onto said substrate using an adhesive.
52. A method for producing a chip scale packaged crystalline substrate based device according to claim 51 and wherein said adhesive comprises epoxy.
53. A method for producing a chip scale packaged crystalline substrate according to claim 50 and wherein said substrate comprises silicon.
54. A method for producing a chip scale packaged crystalline substrate according to claim 50 and wherein said substrate comprises lithium niobate.
55. A device according to claim 1, the substrate, microstructure and packaging layer forming a chip scale package having a multiplicity of electrical contacts plated along edge surfaces thereof.
56. A method for producing a chip scale packaged crystalline substrate according to claim 50 and wherein said at least one gap comprises a plurality of gaps.
57. A method for producing a chip scale packaged crystalline substrate according to claim 50 and wherein said microstructure comprises a micromechanical structure.
58. A method for producing a chip scale packaged crystalline substrate according to claim 50 and wherein said microstructure comprises a microelectronic structure.
59. A method for producing a chip scale packaged crystalline substrate according to claim 41 and wherein said microstructure comprises a optoelectronic structure.

60. A crystalline substrate based device comprising:
a microstructure on a substrate; and
a spacer on said substrate, said spacer defining at least one cavity extending entirely therethrough; and
at least one transparent packaging layer adhesively sealed onto said spacer over said microstructure and at least partially spaced therefrom, thereby to define a gap at said at least one cavity between said microstructure and said at least one packaging layer, wherein the substrate, microstructure and packaging layer form a chip scale package having a multiplicity of electrical contacts plated along edge surfaces thereof.

61. A crystalline substrate based device according to claim 60 and wherein said at least one packaging layer is sealed onto said crystalline substrate using an adhesive.

62. A crystalline substrate based device according to claim 61 and wherein said adhesive comprises Epoxy.

63. A crystalline substrate based device according to claim 60 and wherein said crystalline substrate comprises silicon.

64. A crystalline substrate based device according to claim 60 and wherein said crystalline substrate comprises lithium niobate.

65. A crystalline substrate based device comprising:
a microstructure on a substrate; and
at least one packaging layer;
a spacer on said packaging layer, said spacer defining at least one cavity extending entirely therethrough; and
said at least one packaging layer adhesively sealed onto said spacer over said microstructure and at least partially spaced therefrom, thereby to define a gap at said at least one cavity between said microstructure and said at least one packaging layer, wherein the substrate, microstructure and packaging layer form a chip scale package having a multiplicity of electrical contacts plated along edge surfaces thereof.

66. A crystalline substrate based device according to claim 60 and wherein said at least one gap comprises a plurality of gaps.

67. A crystalline substrate based device according to claim 60 and wherein said microstructure comprises a micromechanical structure.

68. A crystalline substrate based device according to claim 60 and wherein said microstructure comprises a microelectronic structure.

69. A crystalline substrate based device according to claim 60 and wherein said microstructure comprises a optoelectronic structure.

70. A method for producing a crystalline substrate based device according to claim 41 and wherein said crystalline substrate comprises lithium tantalate.

71. A method for producing a crystalline substrate based device according to claim 41 and wherein said microstructure comprises a surface acoustic wave device.

72. A method for producing a device according to claim 41 and wherein said microstructure comprises a surface acoustic wave device.

73. A crystalline substrate based device according to claim 60 and wherein said crystalline substrate comprises lithium tantalate.

74. A crystalline substrate based device according to claim 60 and wherein said microstructure comprises a surface acoustic wave device.

75. A method for producing a crystalline substrate based device according to claim 41 and wherein said crystalline substrate comprises quartz.

76. A crystalline substrate based device according to claim 60 and wherein said crystalline substrate comprises quartz.

77. A method for producing a chip scale packaged crystalline substrate based device comprising:

forming a microstructure on a crystalline substrate; and

providing at least one chip scale package including sealing at least one transparent packaging layer over said microstructure by means of an adhesive and defining therewith at least one gap between said crystalline substrate and said at least one packaging layer,

wherein said microstructure receives light via said at least one transparent packaging layer.

78. A method for producing a crystalline substrate based device comprising:

forming a microstructure on a crystalline substrate; and

sealing at least one packaging layer over said microstructure and defining therewith at least one gap between said crystalline substrate and said at least one packaging layer, the crystalline substrate, microstructure and packaging layer forming a chip scale package,

the chip scale package having a multiplicity of electrical contacts plated along edge surfaces thereof.

79. A method according to claim 78 wherein at least one gap is located over said crystalline substrate and under said at least one packaging layer.

80. A method according to claim 78 wherein said packaging layer is sealed over said microstructure by means of an adhesive.

81. A device according to claim 65 wherein said packaging layer comprises a transparent packaging layer.--

REMARKS

By the present Amendment, claims 41-81 are added with claims 41, 50, 60, 65, 77 and 78 being independent. This leaves claims 1-4, 6-14, 16-19, 30-32, 35 and 37-81 pending in the application.